

CLAIMS

1. Sterol and/or stanol esters of ethercarboxylic acids corresponding to general formula (I):

$$5 \quad R(O\text{Alk})_nOCH_2COOH \quad (\text{I})$$

in which R is a C₁₋₅₀ alkyl, alkenyl and/or alkylphenyl group derived from an alcohol, OAlk stands for ring-opened ethylene oxide, propylene oxide and/or butylene oxide units and n is a number of 0 to 100.

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2. Sterol and/or stanol esters as claimed in claim 1, characterized in that R is a linear C₁₋₃₆ alkyl group optionally containing other functional groups derived from an alcohol.

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3. Sterol and/or stanol esters as claimed in at least one of claims 1 to 2, characterized in that R is a linear C₁₋₁₈ alkyl group derived from a monofunctional alcohol.

4. Sterol and/or stanol esters as claimed in at least one of claims 1 to 2, characterized in that R is a linear hydroxyl-terminated C₂₋₃₆ alkyl group derived from a difunctional alcohol.

5. Sterol and/or stanol esters as claimed in at least one of claims 1 to 4, characterized in that OAlk stands for the ring-opened ethylene oxide unit OCH_2CH_2 .

6. Sterol and/or stanol esters as claimed in at least one of claims 1 to 5, characterized in that n is a number of 1 to 20 and preferably 3 to 15.

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7. A process for the production of sterol and/or stanol esters of

ethercarboxylic acids, characterized in that sterols and/or stanols are esterified with ethercarboxylic acids or their salts corresponding to formula (II):

$$5 \quad R(O\text{Alk})_nOCH_2COOX \quad (\text{II})$$

in which R is a C₁₋₅₀ alkyl, alkenyl and/or alkylphenyl group derived from an alcohol, OAlk stands for ring-opened ethylene oxide, propylene oxide and/or butylene oxide units, n is a number of 0 to 100 and X is hydrogen or an alkali metal, in the presence of an esterification catalyst.

10 an alkali metal, in the presence of an esterification catalyst.

8. The use of the sterol and/or stanol esters of ethercarboxylic acids claimed in claim 1 as a sterol and/or stanol source, preferably as a raw material for the production of steroid precursors, more particularly for the fermentative production of 4-androsten-3,17-dione (AD) and/or 4-androstadien-3,17-dione (ADD).

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9. The use of the sterol and/or stanol esters of ether carboxylic acids claimed in claim 1 as emulsifiers, more particularly in cosmetic compositions and in foods.

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10. The use of the sterol and/or stanol esters of ether carboxylic acids claimed in claim 1 as a cosmetic active component.

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11. The use of the sterol and/or stanol esters of ether carboxylic acids claimed in claim 1 as a hypocholesterolaemic active component, more particularly in foods and/or food supplements.